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biomolecule on the substrate by cytophobic regions to which the biomolecules do not adhere contiguous with the cytophilic regions,
wherein the cytophobic regions comprise one or more surfactant compounds.

65. (New) The device of claim 64 wherein the surfactant compound is not covalently linked to the substrate.
66. (New) The device of claim 64 wherein the surfactant compound comprises one or more hydrophobic regions and one or more hydrophilic regions.
67. (New) The device of claim 64, wherein the surfactant compound comprises one or more heteroatoms.
68. (New) The device of claim 64, wherein the surfactant compound comprises one or more alkoxy groups.
69. (New) The device of claim 64, wherein the surface of the device comprises a polymeric material.
70. (New) The device of claim 64, wherein the surfactant comprises polyethylene oxide.
71. (New) The device of claim 64, wherein the surfactant comprises polyC₃₋₂₀alkyl oxide.
72. (New) The device of claim 64, wherein the surfactant comprises thiol groups.
73. (New) The device of claim 64, wherein the cytophilic regions comprise biomolecules adhered thereto.
74. (New) The device of claim 64, wherein the cytophilic regions comprise cells adhered thereto.

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75. (New) The device of claim 74, wherein cytophilic regions comprise two or more different cell types.
76. (New) The device of claim 74, wherein the cells are of the same cell type.
77. (New) The device of claim 64, wherein the cytophilic regions comprise binding agents for binding the biomolecule.
78. (New) The device of claim 64, wherein the device is in the form of a block.
79. (New) The device of claim 64, wherein the device comprises a plurality of raised features.
80. (New) The device of claim 79, wherein the surface of the device is corrugated.
81. (New) The device of claim 64, wherein the device comprises microfluidic channels.
82. (New) The device of claim 81, wherein the channels comprise cytophilic and cytophobic regions.
83. (New) The device of claim 64, wherein the device is substantially planar.
84. (New) The device of claim 64, wherein the cytophilic regions are for adhering cells and the distance between regions permits intercellular contact.
85. (New) The device of claim 64, wherein the cytophilic regions are for adhering cells and are interconnected so as to form a network of cells when cells are adhered thereto.
86. (New) The device of claim 64, wherein the regions are aligned to form parallel patterns of alternating cytophilic and cytophobic regions.
87. (New) The device of claim 73, wherein the biomolecules comprise nucleic acids.

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88. (New) The device of claim 73, wherein the biomolecules comprise polypeptides.
89. (New) The device of claim 64, wherein the device comprises polydimethylsiloxane.
90. (New) The device of claim 64, wherein the device comprises a slide, chamber, particles, wire, container, capillary, stamp, tubing, sphere, microtiter plate, nanotube, assay plate, microchip, or implantable device.

Pending Claims

Claims 1-6, 9-10, 13, 17-19, 22, 24, 25, 27, 32, 33, 37, 38, 41, 42, 46, 47 are pending. Upon entry of this amendment and response to the Restriction Requirement, all pending claims are cancelled and new claims 64-90 are presented for examination.

The amendments do not add new matter. Support for the amendments may be found throughout the specification, in the Figures, and at least in the claims as originally filed, at page 16, last paragraph, page 7, lines 12-13, page 8, lines 5-15, page 10, last paragraph, page 15, lines 8-15, page 16, page 17, last paragraph, page 18, lines 10-24, page 20, lines 1-8, and at page 24, lines 12-19.

RESPONSE TO RESTRICTION REQUIREMENT

Applicants respond as follows to the Restriction Requirement as set forth in the Office Action dated September 3, 2002.

Applicants hereby elect Group V drawn to a device for adhering a biomolecule in a predetermined position wherein the device has a substrate containing a plurality of regions that adhere a biomolecule and cytophobic regions to which biomolecules do not adhere contiguous with the cytophilic regions, the cytophobic regions comprising a surfactant compound. The pending claims have been cancelled, eliminating claims corresponding to groups I-IV. The newly added claims correspond to the invention recited in the Group V.